

REMARKS

Claims 49-51 remain in the application, with claim 49 being in independent form. The specification has been amended to fix minor typographical and grammatical errors. No new matter has been added.

Based on the following remarks, Applicant respectfully requests that the Examiner reconsider all outstanding objections and rejections, and that they be withdrawn.

Objection to the Drawings

The drawings are objected to because figures 8A, 8B, 13A, 13B, 14A, 14B, 15A, 15B, 16A and 16B are not described in the specification. Applicant respectfully disagrees.

Figures 8a and 8b are described in, for example, the amended paragraph beginning on page 9, line 17 and the amended paragraph beginning on page 18, line 15.

Figures 13a and 13b are described in, for example, the amended paragraph beginning on page 10, line 9 and the amended paragraph beginning on page 16, line 12.

Figures 14a and 14b are described in, for example, the amended paragraph beginning on page 10, line 13; the amended paragraph beginning on page 19, line 7; and the amended paragraph beginning on page 19, line 22.

Figures 15a and 15b are described in, for example, the amended paragraph beginning on page 10, line 17 and the amended paragraph beginning on page 19, line 25.

Figures 16a and 16b are described in, for example, the amended paragraph beginning on page 10, line 20 and the amended paragraph beginning on page 20, line 6.

Based on the above remarks and the amendments to the specification, Applicants respectfully submit that they have overcome the Examiner's objection to the drawings.

Rejection under § 112, paragraph 1 (Enablement Rejection)

At paragraph 3 of the Office Action, claims 49-51 are rejected under 35 U.S.C. 112, first paragraph as containing subject matter which was not described in the specification in such a way as to enable one skilled in the art to which it pertains to make and/or use the invention.

The test of enablement is whether one reasonably skilled in the art could make or use the invention from the disclosures in the patent coupled with information known in the art without undue experimentation. See M.P.E.P. § 2164.01. To satisfy the enablement requirement, the specification need only disclose at least one method for making and using the claimed invention that bears a reasonable correlation to the entire scope of the claim. See M.P.E.P. § 2164.01 (b).

Applicants respectfully submit that the specification discloses at least one method for making and using the claimed invention that bears a reasonable correlation to the entire scope of claims 49-51. As one example, figures 1 and 2 illustrate one embodiment of the invention. These figures illustrates the embodiment in sufficient detail to enable one reasonably skilled in the art to make and use the embodiment without undue experimentation. Moreover, the description of figures 1 and 2, further enable one reasonably skilled in the art to make and use the invention. There are numerous other

figures and sections of the specification, which Applicants could point to, that would enable one reasonably skilled in the art to make and use the other embodiments of the invention without undue experimentation. Applicants, therefore, respectfully request that enablement rejection of claims 49-51 be withdrawn.

To assist the Examiner's understanding of the several different embodiments of the invention, we will answer some of the questions posed by the Examiner.

Examiner's Questions: "What is the meaning of the pipes in figure 18 with respect to the vertical movement and buoyant tank 10 of figure 1? Where [sic] the pipes could be placed in figure 1? What type of generator would function with the pipes? How [sic] the storage member knows when to drain the water down the pipe 56?"

Applicant's Response: There is no relationship between the pipes 52 shown in figure 18 and the apparatus shown in figure 1. The apparatus shown in figure 1 is merely one embodiment of the invention and the apparatus shown in figure 18 is another, separate and distinct embodiment of the invention. Accordingly, the pipes 52 shown in figure 18 have no relationship to the embodiment shown in figure 1.

With respect to the apparatus shown in figure 18, said apparatus generates electrical energy by first pumping water into storage chamber 54 using prime mover 40 and pipe 52. Essentially, the up and down movement of prime mover 40 causes water to flow up pipe 52 and into chamber 54. The water in chamber 54 is then allowed to travel down pipe 56. Element 58, which is at the far end of pipe 56, represents a water turbine. Essentially, the kinetic energy of the water flowing down pipe 56 is converted into electrical energy by the water turbine 58.

Examiner's Questions: "Also, about the wind generator disclosed in the specification, will the wind generator function like the water generator? From figure 19, it seems like if [sic] the cylinder 61 will not make enough pressure to move vertically the buoyant tank 10. Where is the generator? How is the invention disclosed in figure 1 link to the invention disclosed in figure 19 and the invention of figure 18?

Applicant's Response: Like the apparatuses shown in figures 1 and 18, the apparatus shown in figure 19 is an alternative embodiment of the invention. The apparatus of figure 19 is similar to the apparatus of figure 1 in that both embodiments may employ a canoe shaped body 10. However, there are differences between the apparatus shown in figure 19 and the apparatus shown in figure 1. For example, the embodiment shown in figure 19 uses rotating cylinders, whereas the embodiment in figure 1 uses hydroplanes.

As shown in figure 19 and explained in the specification (see the amended paragraph that begins on page 20, line 18), "cylinders 61 rotate I the direction of arrow 63 with respect to current 26. The cylinders produce drag 62 but also a downward force 60, or an upward force when rotation is reversed." Current 26 could be a water current (e.g., a river) or an air current. Like the upward and downward thrust produced by the hydroplanes shown in figure 1, the upward and downward thrust produced by the rotating cylinders can be converted to electrical energy using any known and conventional means, including those described in the application.

Rejection under § 112, paragraph 2 (Indefiniteness Rejection)

At paragraph 4 of the Office Action, claim 51 is rejected as being indefinite. More specifically, the Examiner appears to have rejected claim 51 because claim 51 "discloses a method ... claim, which is dependent on an apparatus claim."

Applicant respectfully traverses this rejection. Neither Applicant nor Applicant's representative is aware of any statute or rule prohibiting a method claim from depending from an apparatus claim. Accordingly, Applicant respectfully requests that the examiner cite such a provision of the statute or rule or withdraw the rejection.

Rejection under § 103 (Obviousness Rejection)

At paragraph 5 of the Office Action claims 49-51 are rejected under 35 U.S.C. § 103 as being unpatentable over Arnold (US 4,347,036) in view of Cockerill (US 4,210,821) and Vowles (US 6,109,209).

Applicants respectfully submit that claims 49-51 are patentable over the art of record. More specifically, Applicants respectfully submit that claim 49 is allowable over Cockerell in view of Vowles and Arnold because neither Cockerell, Vowles, nor Arnold, considered alone or in combination, teach or suggest all of the features of claim 49.

For example, at the least, neither Cockerell, Vowles, nor Arnold, considered alone or in combination, teach or suggest a prime mover comprising "a body [and] first and second hydroplanes mounted on the body and extending from respective sides thereof, ... the hydroplanes being operatively rotatable in unison about [an] axis [that passes through the body] ...," as is recited in claim 49.

In figure 24 of Cockerell, Cockerell discloses a body (see item 88) and a hydroplane (see item 87). As shown in figure 24, the hydroplane 87 extends from one side of the body. However, Cockerell fails to disclose a second hydroplane that extends from an opposite side of the body, as is claimed in claim 49. Consequently, Cockerell fails to teach or suggest all of the features of claim 49.

Neither Vowles nor Arnold make up for the deficient teachings of Cockerell. In figure 1 of Vowles, Vowles discloses a body (see item 47). As shown in figure 1, a first stiff arm (see item 55) is connected to one side of the body 47 and a second stiff arm 55 is connected to the opposite side of the body 47. Vowles, however, does not teach or suggest that the first and second stiff arms 55 are "operative[] [to] rotat[e] in unison ...," as is required by claim 49.


Arnold discloses a plurality of air foils (see item 18). The air foils are disposed within a frame (see item 16). There is simply no teaching or suggestion in Arnold to arrange a first air foil and a second air foil so that the two air foils protrude from opposite sides of a body.

Consequently, neither Vowles nor Arnold make up for the deficient teachings of Cockerell, because neither Vowles nor Arnold, alone or in combination, teach or suggest "a body [and] first and second hydroplanes mounted on the body and extending from respective sides thereof, ... the hydroplanes being operatively rotatable in unison about [an] axis [that passes through the body] ...," as is recited in claim 49.

Because neither Cockerell, Vowles, nor Arnold, considered alone or in combination, teach or suggest all of the features of claim 49, Applicant respectfully requests that the rejection of the present claims be withdrawn.

CONCLUSION

If the Examiner believes, for any reason, that personal communication will expedite prosecution of this application, the Examiner is invited to telephone the undersigned at the number provided.

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